ABSTRACT OF THE DISCLOSURE

The torque sensor outputs a sinusoidal first alternating signal the phase of which changes in accordance with change in the rotation angle of a first shaft, and a sinusoidal second alternating signal the phase of which changes in accordance

5   with change in the rotation angle of a second shaft capable of performing relative rotation, elastically, with respect to the first shaft. A phase difference correspondence signal the waveform of which changes in accordance with change in the phase difference between the first alternating signal and the second alternating signal is output. A value corresponding to the torque transmitted by

10   the first and second shafts is determined from the phase difference correspondence signal. This value corresponding to the transmitted torque is corrected on the basis of a value corresponding to the difference between a first distortion indicator value which changes in accordance with the waveform distortion in the first alternating signal and a second distortion indicator value

15   which changes in accordance with the waveform distortion in the second alternating signal.